

International Journal of Biometeorology

Journal of the International Society of Biometeorology

edited by

W.H. Weihe
Editor-in-Chief

S.W. Tromp
Executive Editor

R.W. Gloyne
Assistant Editor

U. I. C. C.
MAR 6 1975
LIBRARY

VOLUME 18
1974

Published by Swets & Zeitlinger B.V., Amsterdam

CONTENTS OF VOLUME 18

NUMBER 1 - March 1974

Experimental Evaluation of Standard Effective Temperature: A New Biometeorological Index of Man's Thermal Discomfort	R. R. Gonzalez, Y. Nishi and A. P. Gagge	1- 15
Thermal Comfort Conditions in the Morning and in the Evening	P. O. Fanger, J. Højbjørre and J. O. B. Thomsen	16- 22
Effects of High Altitude Exposure on Components of Blood and Urine in Mountaineers	W. A. Galster and P. R. Morrison	23- 32
Adverse Changes in Fibrinolysis, Blood Coagulation and Platelet Function in High Altitude Pulmonary Oedema and their Role in its Pathogenesis	I. Singh and I. S. Chohan	33- 45
Further Observations on the Effect of Air Ions on Influenza in the Mouse	A. P. Krueger, E. J. Reed, M. B. Day and K. A. Brook	46- 56
Deriving a Biophotothermal Time Scale for Barley	G. D. V. Williams	57- 69
Temperature Differences Between Two Pigmented Types of Corn Plants	N. Barthakur	70- 75
A Technique to Measure CO ₂ Exchange under Field Conditions	R. L. Desjardins	76- 83

NUMBER 2 - June 1974

SYMPOSIUM

on

EFFECTS OF WEATHER AND CLIMATE ON PLANTS AND TREES

Held during the 6th International Biometeorological Congress at
Noordwijk, The Netherlands, 3-9 September 1972

Part III: Sand Binding and Desert Plants

Chairman: D. E. Tsuriehl

Introductory Remarks	D. E. Tsuriehl	85- 88
Sand Dune Stabilization in Israel	D. E. Tsuriehl	89- 93
Problems Arising from the Intensive Use of Coastal Dunes in New South Wales, Australia	W. J. Atkinson	94-100
An Ecological Approach to Dune Management in the National Recreation Areas of the United States East Coast	P. J. Godfrey and Melinda M. Godfrey	101-110
Relative Mobility of Sand Dunes as a Function of Grain Mineralogy	J. O. Nigra	111-112
On the Ecology of a Perennial Cucurbit in Indian Arid Zone - CITRULLUS COLOCYNTHIS (Linn.) Schrad	D. N. Sen and M. C. Bhandari	113-120

Drift Sand Reclamation of Walvis Bay, South West Africa	P.J. Le Roux	121-127
La fixation des dunes de la région d'Aquitaine: rôle du pin maritime; influence de l'eau sur la croissance du pin	R. David	128-132
(Dune Fixation in the Region of Aquitain: the Role of Maritime Pines; Influence of Water on the Growth of Pines)		
Fixation des dunes de Gascogne en France	J. Guinaudeau	133-136
(Dune Fixation in Gascogne, France)		
Progress in Coastal Sand Dune Reclamation in Queensland, Australia	D.A. Barr	137-141
Sand Dune Stabilization at El Aaiun - West Sahara	G.A. de Benito	142-144
New Zealand Experience in Stabilization and Afforestation of Coastal Sands	W.J. Wendelken	145-158
Some Experiences from Attempts at Establishing Broadleaved Woody Plants in Some Danish Dunelands	G. Schlätzer	159-167
Plants and Techniques Used for Sand Dune Reclamation in Australia	A. Mitchell	168-173
Instability of Flat Sand Surfaces Under Wind Action. M. Falcon Ascanio		174-181

NUMBER 3 - October 1974

In Memoriam Dr James D. Findlay		183
Comfort of Man in the City: An Energy Balance Model of Man - Environment Coupling	D.L. Morgan and R.L. Baskett	184-198
Multivariate Analysis of Tree Height Increment on Meteorological Variables Near the Altitudinal Tree Limit in Northern England	E. J. White	199-210
Changes in Plasma Cortisol, Blood Antidiuretic Hormone and Urinary Catecholamines in High-Altitude Pulmonary Oedema		
I. Singh, M.S. Malhotra, P.K. Khanna, R.B. Nanda, T. Purshottam, T.N. Upadhyay, U. Radhakrishnan and H.D. Brahmachari		211-221
Age, Smoking Habits, Heat Stress and Their Interactive Effects with Carbon Monoxide and Peroxyacetylnitrate on Man's Aerobic Power		
P.B. Raven, B.L. Drinkwater, S.M. Horvath, R.O. Ruhling, J.A. Gliner, J.C. Sutton and N.W. Bolduan		222-232
Climatic Adaptation in Recently Shorn Merino Sheep	J.B. Donnelly, J.J. Lynch and M.E.D. Webster	233-247
Dispositif d'aéro-ionisation artificielle permettant des traitements ioniques variés	J. M. Oliverreau	248-257
(Artificial Aero-Ionisation Permitting different Ionic Treatments)		

NUMBER 4 - December 1974

A Critical Evaluation of a Biophothermal Time Scale for Barley	G.D.V. Williams	259-271
Hepatic Amoebiasis at High Altitude	I. Singh, Madan Lal, R. B. Nanda and B. R. Kumar	272-278
Effect of Adaptation to High Altitude on Components of Blood and Urine of Lowlanders Compared with High Altitude Natives	K.K. Shivastava and M.S. Malhotra	279-287
Effect of Varying Environmental Temperature on Heat Output and Finger Skin Temperature . R. M. Rai, L. Mathew and S. S. Purkayastha		288-294
Environmental Temperature Effect on Heart Weight of Chickens	J. D. May and J. W. Deaton	295-300
Effect of Sulphur Dioxide (SO ₂) and Heat (35°C) Stressors on Plasma Glucocorticoids and Thyroxine Levels in Mice	W. J. Vanjonack and H. D. Johnson	301-305
Influence of Artificial Air Ionisation on the Human Electroencephalogram	M. Assael, Y. Pfeifer and F. G. Sulman	306-312
Air-Ionometry of Hot, Dry Desert Winds (Sharav) and Treatment with Air Ions of Weather-Sensitive Subjects	F. G. Sulman, D. Levy, A. Levy, Y. Pfeifer, E. Superstine and E. Tal	313-318
Forecasting the Incidence of Fascioliasis from Climatic Data	G. Gettinby, M. J. Hope-Cawdery and J. N. R. Grainger	319-323

AUTHOR INDEX

- Assael, M. 306
 Atkinson, W.J. 94
 Barr, D.A. 137
 Barthakur, N. 70
 Baskett, R.L. 184
 Benito de, G.A. 142
 Bhandari, M.C. 113
 Bolduan, N.W. 222
 Brahmachari, H.D. 211
 Brook, K.A. 46
 Chohan, I.S. 33
 David, R. 128
 Day, M.B. 46
 Deaton, J.W. 295
 Desjardins, R.L. 76
 Donnelly, J.B. 233
 Drinkwater, B.L. 222
 Falcon Ascanio, M. 174
 Fanger, P.O. 16
 Gagge, A.P. 1
 Galster, W.A. 23
 Gettinby, G. 319
 Gliner, J.A. 222
 Godfrey, Melinda M. 101
 Godfrey, P.J. 101
 Gonzalez, R.R. 1
 Grainger, J.N.R. 319
 Guinaudeau, J. 133
 Højbjerg, J. 16
 Hope-Cawdery, M.J. 319
 Horvath, S.M. 222
 Johnson, H.D. 301
 Krueger, A.P. 46
 Kumar, B.R. 272
 Lal, Madan 272
 Le Roux, P.J. 121
 Levy, A. 313
 Levy, D. 313
 Lynch, J.J. 233
 Malhotra, M.S. 279
 Mathew, L. 288
 May, J.D. 295
 Mitchell, A. 168
 Morgan, D.L. 184
 Morrison, P.R. 23
 Nanda, R.B. 272
 Nigra, J.O. 111
 Nishi, Y. 1
 Olivereau, J.M. 248
 Pfeifer, Y. 306-313
 Purkayastha, S.S. 288
 Radhakrishnan, U. 211
 Rai, R.M. 288
 Raven, P.B. 222
 Reed, E.J. 46
 Ruhling, R.O. 222
 Schlätzer, G. 159
 Sen, D.N. 113
 Shivastava, K.K. 279
 Singh, I. 33, 272
 Sulman, F.G. 306-313
 Superstine, E. 313
 Sutton, J.C. 222
 Tall, E. 313
 Thomson, J.O.B. 16
 Tsurieil, D.E. 85, 89
 Upadhyay, T.N. 211
 Vanjonack, W.J. 301
 Webster, M.E.D. 233
 Wendelken, W.J. 145
 White, E.J. 199
 Williams, G.D.V. 57, 259